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| APPLICATION N | 10. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|---------------|--------------------|-------------|----------------------|--------------------------|------------------|
| 10/624,998 | | 07/22/2003 | Bodo Gehrmann | 29462-034CON | 8181 |
| 21890 | 7590 | 12/02/2004 | | EXAM | INER |
| | AUER RC DEPARTI | | YEE, DEBORAH | | |
| 1585 BROADWAY | | | ART UNIT | PAPER NUMBER | |
| NEW YO | ORK, NY | 10036-8299 | | 1742 | |
| | | | | DATE MAIL ED: 12/02/2004 | 4 |

Please find below and/or attached an Office communication concerning this application or proceeding.

| | Application No. | Applicant(s) | | | |
|--|---|--|--|--|--|
| Office Action Summary | 10/624,998 | GEHRMANN ET AL. | | | |
| Office Action Summary | Examiner | Art Unit | | | |
| 7 | Deborah Yee | 1742 | | | |
| The MAILING DATE of this communication app Period for Reply | pears on the cover sheet w | vith the correspondence address | | | |
| A SHORTENED STATUTORY PERIOD FOR REPL THE MAILING DATE OF THIS COMMUNICATION. Extensions of time may be available under the provisions of 37 CFR 1.1 after SIX (6) MONTHS from the mailing date of this communication. If the period for reply specified above is less than thirty (30) days, a repl If NO period for reply is specified above, the maximum statutory period of Failure to reply within the set or extended period for reply will, by statute Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b). | 36(a). In no event, however, may a y within the statutory minimum of thi will apply and will expire SIX (6) MOI | reply be timely filed rty (30) days will be considered timely. NTHS from the mailing date of this communication. | | | |
| Status | | | | | |
| 1) Responsive to communication(s) filed on | | | | | |
| | · action is non-final. | | | | |
| 3) Since this application is in condition for allowar | | ters prosecution as to the mosts is | | | |
| closed in accordance with the practice under E | Ex parte Quavle, 1935 С.Г |) 11 453 0 G 213 | | | |
| Disposition of Claims | , | 2. 11, 400 0.0. 210. | | | |
| | | | | | |
| 4) Claim(s) 2 to 14 is/are pending in the application | | | | | |
| 4a) Of the above claim(s) is/are withdray | vn from consideration. | | | | |
| 5) Claim(s) is/are allowed. | | | | | |
| 6) Claim(s) 2 to 14 is/are rejected. | | | | | |
| 7) Claim(s) is/are objected to. | | ١ | | | |
| 8) Claim(s) are subject to restriction and/or | election requirement. | | | | |
| Application Papers | | | | | |
| 9)☐ The specification is objected to by the Examiner | : | | | | |
| 10)☐ The drawing(s) filed on is/are: a)☐ acce | epted or b) objected to I | by the Evaminer | | | |
| Applicant may not request that any objection to the d | lrawing(s) be held in abevan | Ce See 37 CED 1 95(a) | | | |
| Replacement drawing sheet(s) including the correction | on is required if the drawing | s) is objected to Soc 27 CED 4 424(4) | | | |
| 11) The oath or declaration is objected to by the Exa | aminer. Note the attached | Office Action or form PTO 453 | | | |
| | and attached | Olioc Action of 10/11/2 1021 | | | |
| Priority under 35 U.S.C. § 119 | | | | | |
| 12)⊠ Acknowledgment is made of a claim for foreign | priority under 35 U.S.C. § | 119(a)-(d) or (f). | | | |
| a)⊠ All b)∐ Some * c)∏ None of: | | | | | |
| 1. Certified copies of the priority documents | have been received. | | | | |
| 2. Certified copies of the priority documents have been received in Application No | | | | | |
| 3.⊠ Copies of the certified copies of the priority documents have been received in this National Stage | | | | | |
| application from the International Bureau | (PCT Rule 17.2(a)). | | | | |
| * See the attached detailed Office action for a list o | f the certified copies not r | eceived. | | | |
| , | | | | | |
| attachment(s) | | | | | |
| Notice of References Cited (PTO-892) | 4) 🔲 Interview Su | mmary (PTO-413) | | | |
| Notice of Draftsperson's Patent Drawing Review (PTO-948) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date 8-11-03. | Paper No(s) | /Mail Date ormal Patent Application (PTO-152) | | | |
| Patent and Trademark Office OL-326 (Rev. 1-04) Office Actio | on Summary | Part of Paper No./Mail Date 112804 | | | |

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DETAILED ACTION

Claim Rejections - 35 USC § 103

- 1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 2. Claims 2 to 14 are rejected under 35 U.S.C. 103(a) as being unpatentable over the English abstract of Japanese patent 10017997 or the English abstract of Japanese patent 10060528 cited by applicant in IDS dated August 11, 2003.
- 3. The English abstract of each Japanese patent discloses an iron-nickel alloy with constituents whose wt% ranges overlap those recited by the claims; such overlap renders applicant's composition prima facie obvious despite differences in non-overlapping areas. Note that it would be obvious to one of ordinary skill in the art to select the claimed alloy wt% ranges from the broader disclosure of the prior art because the prior art has the same utility for screen tubes and similar property of low thermal expansion coefficient. See MPEP 2144.05
- 4. Even though the maximum content of S,Ti, Cu, P, AI, and Mg recited in claim 3 is not disclosed by prior art, such would not be a patentable difference since the lower limit of these elements are zero and therefore not required. Moreover, they are impurities restricted at low levels which is similar to the prior art which requires impurities to be maintained at low levels.

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5. Moreover, prior art discloses the thermal expansion at less than 2.0x10-6/K or less than 1.6X10-6/K which meets claims 2, 4 or 12. See JP'997, Table 6 and JP'528, Table 6.

6. Also prior art teaches iron-nickel alloy used for screen tubes and electronic components, which would broadly encompass shadow mask, lead frames, electron guns, components and TV tubes recited by claims 5 to 11, 13 and 14.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Deborah Yee whose telephone number is 571-272-1253. The examiner can normally be reached on Monday-Friday from 6:00 to 2:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Roy King can be reached on 571-272-1244. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Deborah Yee Primary Examiner

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